Appendix C: Detailed Water Quality Results

This appendix provides detailed water quality results supporting Chapter 4. For each subbasin, the appendix provides the following information:

- A table listing the sampling sites and the sources of water quality data for each.
- A map showing the location of sampling sites and the location of hazardous waste sites in the subbasin.
- A table listing the number of samples taken and the number of samples that exceeded water quality standards or guidelines for the entire study period (1967-2002), for each sampling site.
- A table listing the same information for the most recent sampling years only (1998-2002).

Table C.1 Surface water quality sampling sites in the Aberjona River subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investigating Organization	Other Site Names	Sampling Dates	Sampling Frequency
ABJ0.060	0.060	Aberjona River	Inlet to Upper Mystic Lake, Mystic Valley Parkway/Mouth of Aberjona	MWRC, MDC, DEQE		67, 79-81	2-3 times per year
ABJ0.787	0.787	Aberjona River	USGS Permanent Gaging Station (#1102500) d/s of Winchester Center	MWRC, MDC, DEP, DEQE, MMN, USGS, Tufts	ABR006	73, 86 78-81 10/98-2/02 6/02-8/02	few times per yr monthly few times per mo. daily
ABJ2.502	2.502	Aberjona River	Bridge on Swanton St.	MWRC, DEQE, DEP		73, 79-81, 86	2-5 times per yr
ABJ4.091	4.091	Aberjona River	USGS Temporary Gaging Station (#1102474) at Washington St.	USGS	1102474	99-00	4-6 times per yr
ABJ4.140	4.140	Aberjona River	Bridge on Washington St. (southern crossing)	MWRC, DEQE, DEP, MMN	ABR028	73, 79-81, 86 7/00-2/02	2-6 times per yr monthly
ABJ5.549	5.549	Aberjona River	Montvale Ave.	MDC, DEQE		1/78-11/81	Monthly
ABJ6.306	6.306	Aberjona River	Bridge on Washington Cir.	MWRC, DEP		73, 86	4-6 times per yr
ABJ7.236	7.236	Aberjona River	USGS Temporary Gaging Station (#1102460) at Salem St.	MWRC, DEQE, MMN, USGS	ABR049, 1102460	67, 73, 79-81 5/99-6/00	2-4 times per yr monthly
ABJ8.262	8.262	Aberjona River	Olympia St./Ave.	MDC		1/78-11/81	Monthly
ABJ8.784	8.784	Aberjona River	south of Mishawum Road, off parking lot of 99 Restaurant	DEQE		79-81	2-3 times per yr
ABJ8.817	8.817	Aberjona River	Bridge on Mishawum Road	MWRC, DEP		73, 86	4-5 times per yr
ABJ9.490	9.490	Aberjona River	at Industri-Plex Industrial Park off Mishawum Road	MWRC		73	4 times per yr
ABJ10.741	10.741	Aberjona River	(south branch) upstream of its confluence with North Branch, east of Commerce Way	DEQE		79-81	2-3 times per yr
ABJ10.836	10.836	Aberjona River	(north branch) at end of Commerce Way	DEQE		79-81	2-3 times per yr

Site Name	Location by River Kilometer	Water Body	Description	Investigating Organization	Other Site Names	Sampling Dates	Sampling Frequency
ABJ11.113	11.113	Aberjona River	(north branch) downstream of its confluence with an unnamed tributary off gravel road extension of Commerce Way	DEQE		79-81	1-2 times per yr
ABJ12.693	12.693	Aberjona River	West St.	MDC		78, 79	Monthly
ABJ14.180	14.180	Aberjona River	Rte. 129/Lowell St.	MWRC, MDC		67, 73 80, 81	2-3 times per yr monthly
HAL0.089	0.089	Halls Brook	at Boston & Main R.R. bridge, upstream of Halls Brook Holding Area Pond off New Boston Road	MWRC, DEQE		73, 79-81	2-4 times per yr
HAL0.431	0.431	Halls Brook	upstream of New Boston Road	MDC, DEQE		78 - 81	Monthly
SWT0.615	0.615	Sweetwater Brook	at Maple Street Bridge	DEQE		79-81	2-3 times per yr

Table C.2 Summary of water quality data from the Aberjona River subbasin (1967-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	FC (C)	DO	DO Sat	Temp	pH	TSS	TN	TP
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
ABJ0.060	60% (5)	40% (5)	33% (3)	0% (3)	0% (3)	13% (8)			75% (8)
ABJ0.787	75% (115)	39% (115)	9% (70)	0% (70)	0% (70)	9% (75)	11% (19)	100% (92)	46% (171)
ABJ2.502	85% (11)	38% (11)	15% (13)	0% (13)	0% (13)	0% (15)			81% (16)
ABJ4.091	100% (10)	40% (10)	30% (10)	0% (10)	0% (10)	0% (10)		100% (10)	10% (10)
ABJ4.140	76% (33)	36% (33)	0% (33)	0% (31)	0% (31)	0% (35)	0% (20)		63% (35)
ABJ5.549	49% (39)	5% (39)	0% (44)	0% (44)	0% (44)	9% (47)			67% (49)
ABJ6.306	50% (6)	0% (6)	50% (6)	0% (6)	0% (6)	0% (8)			44% (9)
ABJ7.236	69% (16)	13% (16)	12% (17)	0% (17)	0% (17)	0% (25)		100% (10)	48% (25)
ABJ8.262	23% (35)	9% (35)	0% (37)	0% (37)	0% (37)	15% (41)			60% (43)
ABJ8.784	43% (7)	14% (7)	0% (7)	0% (7)	0% (7)	0% (7)			71% (7)
ABJ8.817	33% (6)	33% (6)	33% (6)	0% (6)	0% (6)	0% (8)			78% (9)
ABJ9.490						0% (4)			100% (4)
ABJ10.741	43% (7)	0% (7)	0% (7)	14% (7)	14% (7)	0% (7)			86% (7)
ABJ10.836	43% (7)	0% (7)	29% (7)	0% (7)	0% (7)	0% (7)			86% (7)
ABJ11.113	25% (4)	25% (4)	0% (4)	0% (4)	0% (4)	0% (5)			100% (5)
ABJ12.693	47% (15)	7% (15)	25% (16)	0% (15)	0% (15)	10% (21)			95% (21)
ABJ14.180	32% (19)	0% (19)	14% (21)	0% (21)	0% (21)	19% (27)			71% (28)
HAL0.089	57% (7)	14% (7)	0% (7)	0% (7)	0% (7)	0% (11)			91% (11)
HAL0.431	21% (39)	0% (39)	0% (44)	0% (44)	0% (44)	6% (47)			76% (49)
SWT0.615	100% (7)	86% (7)	17% (6)	0% (6)	0% (6)	0% (7)			

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.3 Summary of water quality data from the Aberjona River subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	**FC (C)**	**ENT**	**EC**	**DO**	**DO Sat**	**DO Sat Calc.**	**pH**	**Temp**	**TSS**	**TN**	**TP**
Sites	>200 cfu/100mL	>1,000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
ABJ0.060												
ABJ0.787	90% (70)	47% (70)	100% (56)		0% (19)	21% (19)	16% (32)	0% (19)	0% (19)	11% (19)	100% (92)	36% (112)
ABJ2.502												
ABJ4.091	100% (10)	40% (10)		100% (10)	0% (10)		40% (10)	0% (10)	0% (10)		100% (10)	
ABJ4.140	65% (20)	15% (20)			15% (20)	5% (20)	3% (32)	0% (20)	0% (18)	0% (20)		53% (19)
ABJ5.549												
ABJ6.306												
ABJ7.236	89% (9)	11% (9)		100% (8)	10% (10)		35% (20)	0% (10)	0% (10)		100% (10)	10% (10)
ABJ8.262												
ABJ8.784												
ABJ8.817												
ABJ9.490												
ABJ10.741												
ABJ10.836												
ABJ11.113												
ABJ12.693												
ABJ14.180												
HAL0.089												
HAL0.431												
SWT0.615												

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.4 Surface water quality sampling sites in the Horn Pond subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organi-zations	Sampling Dates	Sampling Frequency
HPBK0.168	0.168	Wedge Pond	Wedge Pond outlet at Main Street bridge	DEQE	79-81	2-3 times per year
HPBK1.990	1.990	Horn Pond Brook	downstream of Horn Pond at Pond St. bridge	DEQE	80, 81	1 time per year
HPBK4.177	4.177	Cummings Brook	at Lexington Street bridge	DEQE	80, 81	1-2 times per year
HPBK4.379	4.379	Shaker Glen Brook	at Lexington Street bridge	DEQE	80, 81	1-2 times per year

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Table C.5 Summary of water quality data from the Horn Pond subbasin (1980-1981).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	**FC (C)**	**DO**	**DO Sat**	**Temp**	**pH**	**TSS**	**TN**	**TP**
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
HPBK0.168	67% (6)	17% (6)	0% (7)	14% (7)	0% (7)	0% (6)			83% (6)
HPBK1.990	50% (2)	50% (2)	0% (1)		0% (1)	0% (2)			100% (2)
HPBK4.177	100% (3)	0% (3)	0% (3)		0% (3)	0% (3)			100% (3)
HPBK4.379	33% (3)	33% (3)	0% (3)		0% (3)	0% (3)			100% (3)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.6 Surface water quality sampling sites in the Mystic Lakes subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organi-zations	Other Site Names	Sampling Dates	Sampling Frequency
MLD		Upper Mystic Lake	Mystic Lakes Dam (outlet of Upper Mystic Lake)	MWRC, MDC, DEQE, DEP, MMN	UPL001	67, 73, 86 2/78-10/81, 7/00-2/02	4-6 times per yr. monthly
SAB		Upper Mystic Lake	Sandy Beach	MDC, MMN, Tufts		1/78-12/79 5/02-8/02	monthly daily

Table C.7 Summary of water quality data from the Mystic Lakes subbasin (1967-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	**FC (C)**	**DO**	**DO Sat**	**Temp**	**pH**	**TSS**	**TN**	**TP**
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
ML Dam	10% (63)	2% (63)	0% (68)		0% (66)	7% (76)	0% (18)		43% (79)
Sandy Beach	25% (63)	6% (63)	0% (16)		0% (16)	5% (19)			74% (19)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C-8 Summary of water quality data from the Mystic Lakes subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	FC (C)	ENT	EC	DO	DO Sat	DO Sat Calc.	pH	Temp	TSS	TN	TP
Sites	>200 cfu/100mL	>1000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MLD	11% (18)	0% (18)			0% (18)	0% (18)	0% (28)	12% (17)	0% (17)	0% (18)		6% (17)
SAB	31% (52)	8% (52)	23% (61)		0% (2)	0% (2)	0% (2)		0% (2)			

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.9 Surface water quality sampling sites in the Mill Brook subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organi-zations	Other Site Names	Sampling Dates	Sampling Frequency
MIL0.041s	0.041	Mill Brook	Mt. Pleasant Cemetery	MMN	MIB001	7/00-2/02	monthly
MIL0.053	0.053	Mill Brook	Bridge on Mystic Valley Parkway	MWRC, MDC, DEQE		73 1/78-11/81	4 times monthly
MIL0.062	0.062	Mill Brook	USGS Temporary Gaging Station 1103015	USGS	1103015	99-00	Monthly monthly
MIL0.760	0.760	Mill Brook	Mystic St.	MDC		1/80-7/81	monthly
MIL2.385	2.385	Mill Brook	Brattle St.	MDC		1/80-10/81	monthly
MIL4.448	4.448	Mill Brook	Arlington Reservoir Outlet	MDC		1/80-7/81	monthly
MIL5.985	5.985	Mill Brook	Massachusetts Ave.	MDC		1/80-7/81	monthly

Table C.10 Summary of water quality data from the Mill Brook subbasin (1973-2002).

	Percentage of samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	FC (C)	DO	DO Sat	Temp	pH	TSS	TN	TP
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MIL0.041s	95% (20)	55% (20)	0% (20)		0% (19)	0% (20)	35% (20)		84% (19)
MIL0.053	38% (39)	21% (39)	0% (45)		0% (44)	13% (52)			81% (54)
MIL0.062	100% (10)	80% (10)	0% (9)		0% (10)	10% (10)		100% (10)	50% (10)
MIL0.760	100% (1)	0% (1)	0% (16)		0% (16)	19% (16)			75% (16)
MIL2.385	0% (1)	0% (1)	0% (16)		0% (16)	19% (16)			75% (16)
MIL4.448	0% (1)	0% (1)	6% (16)		0% (16)	0% (14)			100% (14)
MIL5.985	0% (1)	0% (1)	19% (16)		0% (16)	19% (16)			94% (16)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.11 Summary of water quality data from the Mill Brook subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	**FC (C)**	**ENT**	**EC**	**DO**	**DO Sat**	**DO Sat Calc.**	**pH**	**Temp**	**TSS**	**TN**	**TP**
Sites	>200 cfu/100mL	>1000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MIL0.041s	95% (20)	55% (20)			0% (20)	10% (20)	9% (33)	0% (20)	0% (19)	35% (20)		84% (19)
MIL0.053												
MIL0.062	100% (10)	80% (10)		100% (8)	0% (9)		0% (9)	10% (10)	0% (10)		100% (10)	50% (10)
MIL0.760												
MIL2.385												
MIL4.448												
MIL5.985												

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.12 Surface water quality sampling sites in the Mystic River 1 subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organi-zations	Other Site Names	Sampling Dates	Sampling Frequency	Notes
MYS2.915m	2.915	Mystic River	Amelia Earhart Dam upstream side	MWRA	167	11/96-11/99, 12/99-8/02	several times per mo.	96 -99: surface, middle and bottom samples
MYS3.134m	3.134	Mystic River	Mystic/Malden confluence	MWRA	059	89, 90, 92-95 90 91, 96 97 6/98-12/98 99 - 02	daily (Aug-Sept) daily (August) daily (Jun-July) daily (July-Aug) several times per mo. (Mar-Dec)	
MYS3.160m	3.160	Mystic River	above Amelia Earhart Dam	MWRC, DEQE, DEP		73, 79-81	1-4 times per yr	
MYS3.883m	3.883	Mystic River	at Route 28	DEP, MWRA	067	89, 92, 93 90 (daily) 11/90 to 7/91	daily (Aug-Sept) daily (August) several times per mo.	
MYS3.912	3.912	Mystic River	Wellington Bridge	MDC		1/80-11/81	Monthly	
MYS4.372s	4.372	Mystic River	Blessing of the Bay Boathouse	MMN, Tufts		5/02-8/02	Daily	
MYS4.419	4.419	Mystic River	MDC sailing dock	MWRA	060	8/89-9/89, 8/90, 6/91-7/91	Daily	
MYS5.844m	5.844	Mystic River	Mystic River basin	MWRA	068	8/89-9/89	Daily	
MYS5.912	5.912	Mystic River	Rte. 16 bridge near Meadow Glen Drive-In Theatre	MWRC, DEP, MWRA		67, 73	4 times per yr.	
MYS7.111m	7.111	Mystic River	100 m upstream of Rt. 93	MWRA	056	89, 92-95 90 91, 96 97 98 98-02	daily (Aug-Sept) daily (August) daily (June-July) daily (June-Aug) many x per mo. (June-Dec) many x per mo. (Mar-Dec)	
MYS7.948	7.948	Mystic River	at Route 38/16	DEQE, DEP		79, 80, 81, 86	1-6 times per yr.	
MYS8.054	8.054	Mystic River	Medford Square	MWRA	061	89	daily (Aug-Sept)	
MYS8.326n	8.236	Meeting-house Brook	outlet into Mystic R/unnamed tributary 20-25 meters d/s of Winthrop St on northern bank	DEQE, MMN	MEB001	81 7/00-2/02	once monthly	
MYS8.422	8.422	Mystic River	Winthrop St.	MDC, DEQE		1/78-11/81	Monthly	
MYS9.195s	9.195	Mystic River	Mystic Valley Parkway	MWRA	058	89 97	daily (Aug-Sept) daily (August)	

MYS9.570m	9.570	Mystic River	Bridge on Boston Ave.	MWRC, DEP, MWRA	066	73, 86 89 3/99-11/99, 12/99-8/02	4-6 times per yr. daily (July-Sept) several times per mo.	99: surface, middle, and bottom samples
MYS9.653s	9.653	Mystic River	creek 200m downstream #57	MWRA	120	92	Once	
MYS9.861s	9.861	Mystic River	upstream Rt. 16 Bridge	MWRA	119	9/92	Daily	
MYS9.911	9.911	Mystic River	Mystic/Alewife confluence	MWRA	057	89, 93-95 90 92 91, 96 97 98-02	daily (Aug-Sept) daily (August) daily (Sept) daily (June-July) daily (July-Aug) several times per mo.	
MYS10.050m	10.050	Mystic River	upstream of Mystic/Alewife confluence	MWRA	083	90 91, 96 92-95 97 98-02	daily (August) daily (June to July) daily (Aug-Sept) daily (June-Aug) several times per mo.	
MYS11.050s	11.050	Mystic River	USGS Temporary Gaging Station 1103017	USGS	1103017	5/99-6/00	Monthly	
MYS11.077s	11.077	Mystic River	Outlet of Lower Mystic Lake, High St.	MWRC, MDC, DEQE, DEP, MMN, Tufts	MYR071	67, 73, 86 1/78-11/81, 7/00-2/02 5/02-8/02	4-6 times per yr. monthly daily	

Table C.13 Summary of water quality data from the Mystic River 1 subbasin (1967-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	**FC (C)**	**DO**	**DO Sat**	**Temp**	**pH**	**TSS**	**TN**	**TP**
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MYS2.915m	24% (327)	7% (327)	10% (826)		0% (838)	28% (720)	86% (91)	100% (269)	74% (285)
MYS3.134m	21% (274)	4% (274)	3% (147)		0% (151)		0% (22)	100% (5)	36% (11)
MYS3.160m	60% (5)	40% (5)	0% (5)		0% (5)	11% (9)			100% (9)
MYS3.883m	33% (67)	6% (67)	1% (78)		0% (78)		11% (27)	100% (8)	46% (24)
MYS3.912	29% (17)	0% (17)	10% (20)		0% (20)	22% (18)			100% (8)
MYS4.372s	68% (53)	26% (53)							
MYS4.419	11% (27)	4% (27)	0% (35)		0% (35)		9% (23)	100% (7)	50% (8)
MYS5.844m	33% (6)	17% (6)	0% (7)		0% (7)		0% (2)	100% (1)	100% (1)
MYS5.912						0% (8)			100% (8)
MYS7.111m	69% (259)	14% (259)	1% (145)		0% (148)		8% (24)	100% (8)	75% (8)
MYS7.948	64% (11)	27% (11)	9% (11)		9% (11)	0% (9)			100% (10)
MYS8.054	43% (7)	29% (7)	0% (8)		0% (8)		0% (6)	100% (2)	100% (1)
MYS8.326n	67% (21)	33% (21)	0% (20)		0% (21)	0% (19)	21% (19)		58% (19)
MYS8.422	53% (30)	3% (30)	3% (34)		0% (35)	8% (38)			78% (40)
MYS9.195s	35% (20)	30% (20)	0% (13)		0% (16)		13% (8)	100% (5)	100% (1)
MYS9.570m	52% (221)	16% (221)	10% (146)		0% (146)	6% (141)	40% (47)	100% (168)	63% (178)
MYS9.653s			0% (1)		0% (1)				
MYS9.861s	50% (2)	0% (2)	0% (4)		0% (4)				

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	**FC (C)**	**DO**	**DO Sat**	**Temp**	**pH**	**TSS**	**TN**	**TP**
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MYS9.911	45% (241)	16% (241)	1% (150)		0% (154)		9% (23)	83% (6)	71% (7)
MYS10.050m	24% (259)	7% (259)	1% (152)		0% (157)		11% (18)	67% (3)	70% (10)
MYS11.050s	30% (10)	0% (10)	11% (9)		0% (10)	0% (10)		100% (10)	10% (10)
MYS11.077s	49% (117)	12% (117)	4% (72)		0% (71)	15% (78)	0% (19)		58% (83)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.14 Summary of water quality data from the Mystic River 1 subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	**FC (C)**	**ENT**	**EC**	**DO**	**DO Sat**	**DO Sat Calc.**	**pH**	**Temp**	**TSS**	**TN**	**TP**
Sites	>200 cfu/100mL	>1,000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MYS8.326n	65% (20)	30% (20)			0% (19)	0% (19)	0% (32)	0% (18)	0% (20)	21% (19)		61% (18)
MYS2.915m	22% (269)	7% (269)	24% (271)		11% (691)	13% (691)	16% (691)	23% (603)	0% (694)	35% (222)	100% (219)	80% (220)
MYS3.134m	19% (108)	3% (108)	14% (106)		0% (2)	0% (2)	0% (2)		0% (2)			
MYS3.160m												
MYS3.883m												
MYS3.912												
MYS4.372s	68% (53)	26% (53)	25% (53)									
MYS4.419												
MYS5.844m												
MYS5.912												
MYS7.111m	68% (101)	12% (101)	55% (101)		0% (2)	0% (2)	0% (2)		0% (2)			
MYS7.948												
MYS8.054												
MYS8.422												
MYS9.195s												
MYS9.570m	50% (206)	16% (206)	77% (204)		11% (133)	14% (133)	14% (133)	7% (133)	0% (133)	11% (171)	100% (168)	62% (169)
MYS9.653s												
MYS9.861s												
MYS9.911	33% (76)	8% (76)	58% (76)		0% (2)	0% (2)	0% (2)		0% (2)			
MYS10.050m	20% (104)	5% (104)	57% (104)		0% (13)	0% (13)	0% (13)		0% (13)			
MYS11.050s	30% (10)	0% (10)		44% (9)	11% (9)		0% (9)	20% (10)	0% (10)		100% (10)	10% (10)
MYS11.077s	47% (72)	8% (72)	71% (45)		0% (20)	0% (18)	0% (32)	12% (17)	0% (19)	0% (19)		21% (19)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.15 Surface water quality sampling sites in the Alewife Brook subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investigating Organizations	Other Site Names	Sampling Dates	Sampling Frequency
ALE0.076	0.076	Alewife Brook	Bridge on Mystic Valley Parkway	MWRC, MDC, DEQE, DEP, MWRA, Tufts	070	73, 86, 88, 89 78, 79, 80, 81 90-91, 98-02 96-97	2-8 times per year monthly few times per year daily during summer
ALE0.144	0.144	Alewife Brook	Dilboy Field Parking Lot	MDC, MMN, Tufts		7/02 to 8/02	daily
ALE0.431	0.431	Alewife Brook	off Sunnyside Avenue, above Dilboy Field	DEP		88	twice
ALE0.474	0.474	Alewife Brook	Mid-channel off SOM-002A	MWRA	071	89	few times per year
ALE0.937w	0.937	Alewife Brook	at Broadway St./downstream side of bridge above St. Paul's Cemetery	DEP, MWRA, MMN, Tufts	072, ALB006	8/89-9/99, 5/02-7/02 7/00-9/00 10/00-2/02	daily storm sampling monthly
ALE0.972w	0.972	Alewife Brook	USGS Temporary Gaging Station 1103025	USGS	1103025	5/99-6/00	monthly
ALE1.333w	1.333	Alewife Brook	Cambridge/Somerville line	MWRA	073	8/89-9/89	daily
ALE1.253	1.253	Alewife Brook	Bridge on Cross St	Tufts		7/00-9/00	storm sampling
ALE1.623w	1.623	Alewife Brook	upstream side of Massachusetts Avenue Bridge	DEP, MWRA	172	88 2/99-8/02	3 times several times per mo.
ALE1.656	1.656	Alewife Brook	Bridge on Massachusetts Ave.	MWRC, DEQE, Tufts		73, 81 7/00-9/00	2-4 times per yr storm sampling
ALE2.466w	2.466	Alewife Brook	offramp to Alewife T	MWRA, Tufts	074	8/89-9/89 90, 91, 99-02 7/00 - 9/00	Daily few times per mo. (several mo. in a row) storm sampling
LIT1.358	1.358	Little Pond	outlet of Little Pond	DEP		88	2 times
LIT0.023	0.023	Little River	downstream side of Rindge Avenue Extension Bridge	DEP		88	2 times
LIT0.189n	0.189	Little River	125-m upstream of Rt. 2E - offramp to Alewife T	MWRA	174	8/99-11/99, 4/00-8/02	several times per mo.
LIT0.345	0.345	Little River	below Arthur D. Little Complex	DEP		88	3 times
LIT0.585	0.585	Little River	above Arthur D. Little Complex	DEP		88	2 times
LIT1.189	1.189	Little River	Pond St.	DEP		88	2 times
WIN0.0		Winn Brook	inlet to Little Pond	MMN	WIB001	7/00-2/02	monthly

Table C.16 Summary of water quality data from the Alewife Brook subbasin (1973-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]										
	FC (B)	FC (C)	EC	Entero	DO	DO Sat	Temp	pH	TSS	TN	TP
Sites	>200 cfu/mL	>1000 cfu/mL	>126 cfu/mL	>33 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
ALE0.076	84% (322)	49% (322)	100% (18)	94% (261)	36% (206)		0% (209)	5% (56)	6% (18)	75% (8)	27% (169)
ALE0.144	100% (19)	100% (19)		100% (40)							
ALE0.431	100% (2)	50% (2)			50% (2)		0% (2)	0% (2)			100% (2)
ALE0.474	14% (7)	0% (7)		14% (7)	78% (9)		0% (9)		25% (4)	100% (2)	100% (1)
ALE0.937w	95% (80)	69% (80)	100% (18)	89% (36)	54% (28)		0% (28)	0% (19)	22% (23)		100% (21)
ALE0.972w	100% (8)	75% (8)	100% (9)		36% (11)		0% (12)	0% (12)		100% (12)	100% (12)
ALE1.333w	20% (5)	0% (5)		0% (5)	100% (7)		0% (7)		0% (3)		
ALE1.253	90% (20)	75% (20)	100% (18)				0% (3)				
ALE1.623w	98% (106)	51% (106)		99% (103)	69% (13)		0% (13)	0% (3)			100% (3)
ALE1.656	100% (19)	95% (19)	94% (18)		100% (2)		0% (3)	0% ()			100% (6)
ALE2.466w	93% (134)	59% (134)	100% (22)	96% (111)	23% (31)		0% (33)		13% (8)	100% (2)	100% (3)
LIT1.358	100% (2)	100% (2)			100% (2)		0% (2)	50% (2)			50% (2)
LIT0.023	100% (2)	100% (2)			100% (2)		0% (2)	50% (2)			100% (2)
LIT0.189n	93% (84)	51% (84)		94% (85)							
LIT0.345	100% (3)	100% (3)			100% (3)		0% (3)	0% (3)			100% (3)
LIT0.585	100% (2)	100% (2)			100% (2)		0% (2)	50% (2)			100% (2)
LIT1.189	50% (2)	50% (2)			100% (2)		0% (2)	0% (2)			100% (2)
WIN0.0	0% (20)	0% (20)			0% (20)		0% (20)	5% (20)	20% (20)		94% (16)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.17 Summary of water quality data from the Alewife Brook subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	FC (C)	ENT	EC	DO	DO Sat	DO Sat Calc.	pH	Temp	TSS	TN	TP
Site	>200 cfu/100mL	>1,000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
ALE0.076	83% (121)	45% (121)	90% (103)	100% (18)	14% (14)	57% (14)	57% (14)		0% (15)			
ALE0.144	100% (19)	100% (19)	100% (40)									
ALE0.431												
ALE0.474	0% (1)	0% (1)	0% (1)		0% (1)	0% (1)	0% (1)		0% (1)			
ALE0.937w	100% (72)	72% (72)	100% (30)	100% (18)	30% (20)	53% (19)	55% (33)	0% (17)	0% (20)	25% (20)		100% (19)
ALE0.972w	100% (8)	75% (8)		100% (9)	27% (11)		45% (11)	0% (12)	0% (12)		100% (12)	100% (12)
ALE1.333w												
ALE1.253	100% (20)	75% (20)		100% (20)					0% (3)			

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	FC (C)	ENT	EC	DO	DO Sat	DO Sat Calc.	pH	Temp	TSS	TN	TP
Site	>200 cfu/100mL	>1,000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
ALE1.623w	98% (103)	50% (103)	99% (103)		60% (10)	60% (10)	60% (10)		0% (10)			
ALE1.656	100% (17)	94% (17)		94% (18)					0% (1)			
ALE2.466w	93% (111)	60% (111)	97% (88)	100% (22)	44% (9)	44% (9)	44% (9)		0% (11)			
LIT1.358												
LIT0.023												
LIT0.189n	94% (84)	61% (84)	94% (85)									
LIT0.345												
LIT0.585												
LIT1.189												
WIN0.0	80% (20)	50% (20)			0% (20)	0% (20)	0% (33)	5% (20)	0% (20)	20% (20)		94% (16)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.18 Surface water quality sampling sites in the Malden River subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organizations	Other Site Names	Sampling Dates	Sampling Frequency
MAL0.985	0.985	Malden River	Rte. 16 Bridge	MWRC, MDC		67	4 times
MAL2.570w	2.570	Malden River	Medford St.	MDC, DEQE MMN	MAR036	1/78-11/81 7/00-12/02	monthly

Table C.19 Summary of water quality data from the Malden River subbasin (1967-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	FC (C)	DO	DO Sat	Temp	pH	TSS	TN	TP
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MAL0.985						0% (4)			100% (4)
MAL2.570w	57% (53)	28% (53)	2% (60)		3% (61)	5% (60)	5% (19)		83% (63)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.20 Summary of water quality data from the Malden River subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	FC (C)	ENT	EC	DO	DO Sat	DO Sat Calc.	pH	Temp	TSS	TN	TP
Sites	>200 cfu/100mL	>1000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MAL0.985												
MAL2.570w	61% (18)	22% (18)			0% (19)	21% (19)	19% (32)	6% (16)	5% (20)	5% (19)		88% (17)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.21 Surface water quality sampling sites in the Mystic River 2 subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organi-zation	Other Site Names	Sampling Dates	Sampling Frequency	Notes
MYS0.108m	0.108	Mystic River	Confluence between Mystic and Chelsea Rivers	MWRA	015	89 - 98	daily (June-Sept)	surface and bottom samples
MYS1.407m	1.407	Mystic River	1/3-mile upstream of Tobin Bridge	MWRA	137	6/94 to 8/02	several x per mo.	surface and bottom samples
MYS2.344s	2.344	Mystic River	near Schrafft's Building, BOS 017	MWRA	069	89 - 90, 92 - 95 91, 96, 97	daily (Aug-Sept) daily (June-July)	surface and bottom samples
MYS2.787s	2.787	Mystic River	below Amelia Earhart Dam, MRW205	MWRA	052	89-90, 92-95 11/90-3/91, 8/96-4/97 6/91-8/91, 1/92-2/92, 6/96-7/96, 6/97-8/97, 6/98-7/98 8/98-8/02	daily (Aug-Sept) several x per mo. daily daily daily several x per mo.	89-98: surface and bottom samples

Table C.22 Summary of water quality data from the Mystic River 2 subbasin (1989-2002).

	Percentage of samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	FC (C)	DO	DO Sat	Temp	pH	TSS	TN	TP
Site	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MYS0.108m	32% (555)	12% (555)	4% (582)	3% (306)	0% (594)		19% (103)	100% (58)	67% (54)
MYS1.407m									
MYS2.344s	38% (271)	13% (271)	12% (280)	4% (151)	0% (291)		2% (44)	100% (13)	39% (33)
MYS2.787s	49% (676)	20% (676)	28% (374)	14% (145)	0% (381)		8% (115)	97% (61)	60% (25)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.23 Summary of water quality data from the Mystic River 2 subbasin (1998-2002).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	**FC (C)**	**ENT**	**EC**	**DO**	**DO Sat**	**DO Sat Calc.**	**pH**	**Temp**	**TSS**	**TN**	**TP**
Sites	>200 cfu/100mL	>1,000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
MYS0.108m	0% (2)	0% (2)	50% (2)		0% (2)	0% (2)	50% (2)		0% (2)			
MYS1.407m	10% (324)	3% (324)	10% (379)		0% (3)	0% (3)	0% (3)		0% (3)	6% (280)		
MYS2.344s	50% (6)	17% (6)	43% (7)									
MYS2.787s	37% (267)	16% (267)	34% (286)		0% (7)	0% (7)	43% (7)		0% (7)			

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C.24 Surface water quality sampling sites in the Chelsea Creek subbasin

Site Name	Location by River Kilometer	Water Body	Description	Investi-gating Organi-zation	Other Site Names	Sampling Dates	Sampling Frequency	Notes
CCK0.143	0.143	Chelsea Creek	Chelsea River	MWRA	NE01			
CCK0.463m	0.463	Chelsea Creek	Chelsea off McCardle Bridge	MWRA	15.1	11/90 to 1/91	several x per mo.	surface and bottom samples
CCK0.613m	0.613	Chelsea Creek	(Mile 0.2) at Meridian St.	MWRA	CR01			
CCK1.497m	1.497	Chelsea Creek	Chelsea River Mid-Channel	MWRA	027	89 – 95 96 - 97	daily (Aug-Sept) daily (June-July)	surface and bottom samples
CCK3.707m	3.707	Chelsea Creek	G"7" - near Merritt Park	MWRA	IH06			
CCK3.845m	3.845	Inner Harbor	Near Head of Chelsea River	MWRA	026	89 - 90 4/99	daily (Aug-Sept) daily	surface and bottom samples in 89

Table C.25 Summary of water quality data from the Chelsea Creek subbasin (1989-1999).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]								
	FC (B)	**FC (C)**	**DO**	**DO Sat**	**Temp**	**pH**	**TSS**	**TN**	**TP**
Sites	>200 cfu/mL	>1000 cfu/mL	<5 mg/L	<60%	>28.3 °C	<6.5 or >8.3	>10 mg/L	>0.3 mg/L	>0.05 mg/L
CCK0.143									
CCK0.463m	0% (9)	0% (9)	0% (12)		0% (12)				71% (7)
CCK0.613m									
CCK1.497m	30% (281)	12% (281)	10% (276)	7% (149)	0% (283)		4% (45)	100% (19)	85% (20)
CCK3.707m									
CCK3.845m	23% (35)	9% (35)	14% (42)	0% (8)	0% (42)		11% (19)	100% (2)	67% (9)

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.

Table C-26 Summary of water quality data from the Chelsea Creek subbasin (1998-1999).

	Percentage of Samples in Violation of Water Quality Standards/Guidelines[1]											
	FC (B)	**FC (C)**	**ENT**	**EC**	**DO**	**DO Sat**	**DO Sat Calc.**	**pH**	**Temp**	**TSS**	**TN**	**TP**
Sites	>200 cfu/100mL	>1,000 cfu/100mL	>33 cfu/100mL	>126 cfu/100mL	<5 mg/L	<60%	<60%	<6.5 or >8.3	>28.3°C	>10 mg/L	>0.3 mg/L	>0.05 mg/L
CCK0.143												
CCK0.463m												
CCK0.613m												
CCK1.497m	0% (2)	0% (2)	0% (2)		0% (2)	0% (2)	50% (2)		0% (2)			
CCK3.707m												
CCK3.845m	43% (7)	29% (7)	43% (7)		0% (8)	0% (8)	0% (8)		0% (8)			

[1] See Table 4-2 for a description of the standards and guidelines used. Results are expressed as a percentage of the total samples analyzed (shown in parentheses). For example, "64% (11)" indicates that 64% of the 11 samples analyzed did not comply with the water quality standard or guideline.